REMARKS

Claims 1, 2, 6, 7, 11-17, 19-28 and 30-32 are pending in the present application. No new matter has been presented.

Claim Rejections - 35 U.S.C. §§ 102 and 103

Claims 1, 2, 7, 26, 27, 28 and 32 were rejected under 35 U.S.C. § 102(b) as being unpatentable over **Tatsuhiko** (JP 09-058650); claims 6, 17, 30 and 31 were rejected under 35 U.S.C. § 103(a) as being unpatentable over **Tatsuhiko** in view of **Akao** (US 5,358, 785); claims 11 and 12 were rejected under 35 U.S.C. § 103(a) as being unpatentable over **Tatsuhiko** in view of **Miyake** (US 5,942,320); claim 13 was rejected under 35 U.S.C. § 103(a) as being unpatentable over **Tatsuhiko** in view of **Akao** in further view of **Miyake**; and claims 14-16 and 19-25 were rejected under 35 U.S.C. § 103(a) as being unpatentable over **Tatsuhiko** in view of **Frisk** (WO 00/44632 with US 6,974,612 cited as an English equivalent).

Favorable reconsideration is requested.

Applicants first note that the rejection based on Tatsuhiko under § 102 is improper since the Office Action acknowledges that Tatsuhiko does not teach certain claimed features, but states that these missing features would have been obvious. (Office Action, page 3.) Thus, the reasoning provided for the rejection is improper for a rejection under § 102 for anticipation which requires that a prior art reference teach every limitation of a claim either expressly or inherently. MPEP § 2131.

(1) Applicants respectfully submit that Tatsuhiko does not teach or suggest an adhesive layer on both sides of a barrier resin layer as recited in claim 1, and thus, Tatsuhiko does not anticipate claim 1.

Applicants also respectfully submit that the present invention as recited in the claims provides unexpected results due to the use of the combination of adhesive layers in the recited structural relationship, and thus, would overcome an obviousness rejection.

The Office Action appears to take the position that the noted feature is taught in paragraph 15. However, the Office Action also acknowledges that Tatsuhiko does not disclose an adhesive layer on both sides of the barrier layer, and takes the position that this feature would have been obvious. (Office Action, pages 2-3.)

Tatsuhiko discloses that an adhesive layer can be between layers of each resin to raise adhesive property. (Paragraph 15.) However, Tatsuhiko is silent about having an adhesive layer on both sides of the barrier resin layer. An example of the composition in which a polyethylene imine undercoat is attached to a base paper is disclosed in claim 3 of Tatsuhiko. However, in Tatsuhiko, polyethylene imine is coated with the object to further strengthen the adhesion of a specific base paper with a specific polyamide resin at the time when a multi-resin layer comprising a polyamide resin/an adhesive resin/and polyethylene is laminated by co-extrusion on the base paper, as shown in Example 2 of Tatsuhiko; thus it does not have the object to at least laminate the adhesive resin layer (a)/EVOH (b)/and the adhesive resin layer (a') by co-extrusion thereby enabling the adhesion of the base paper with the adhesive resin layer (a) by the low-temperature processing at 290 °C or lower, as recited in the present claims.

Furthermore, as demonstrated in the present specification and the declaration submitted with the Response of September 2, 2010, the present invention provides unexpected results due to the use of the combination of adhesive layers in the recited structural relationship.

The present specification describes that without the adhesive layer on both sides of the barrier layer, the barrier layer in a molten state during processing is directly contacted with the air until it is contacted with the base paper causing oxidative degradation, and that the barrier layer has a non-uniform thickness due to direct contact with the base paper. (Specification, page 4.) The declaration also demonstrates that the second adhesive resin layer formed on the base paper's side of the barrier layer has an unexpected and important effect of protecting the barrier layer.

(2) Applicants respectfully submit that Tatsuhiko does not disclose "wherein the multi-resin layer is bondable, at 290°C or lower at the outlet of the die, onto the base paper without thermal decomposition of the barrier resin layer" as recited in claim 1.

Applicants previously pointed out that Tatsuhiko does not disclose this feature. (Response, September 2, 1010, page 6.) In response, the Office Action stated that this argument is not persuasive because it is not supported by evidence in a declaration. (Office Action, page 9.) However, Applicants note that the argument is supported by evidence in the specification, *i.e.*, Comparative Examples 1 and 2. Evidence can be presented by Applicants by way of a declaration or the evidence may be presented in the specification. MPEP § 2145 citing *In re Soni*, 54 F.3d 746, 750 (Fed. Cir. 1995) ("error not to consider evidence presented in the specification").

As noted in the previous response, although existence of the adhesive resin layer formed on the base paper's side of the barrier EVOH layer has a special meaning, the object of the present invention cannot be achieved easily by merely providing the adhesive layer. In other words, high adhesion strength between the base paper and the adhesive resin layer cannot be obtained only by the composition of the foregoing Experimental Example 2 when the processing temperature of the multi-resin layer is 290 °C or lower. This is demonstrated in the Examples and Comparative Examples in the specification of the present invention.

When the multi-resin layer was laminated by co-extrusion at the processing temperature of 280 °C in the structure of Comparative Example 1 in the specification of the present invention, sufficient adhesion strength between the base paper and the adhesive resin on the base paper's side of the multi-resin layer could not be obtained.

In Comparative Example 2, lamination of the multi-resin layer by co-extrusion at 315 °C gave sufficient adhesion strength between the base paper and the adhesive resin on the base paper's side of the multi-resin layer, but the odor strength of the laminate was so strong that the gustatory evaluation with a molded paper container was low.

In the present invention, the processing temperature of the multi-resin layer needs to be 290 °C or lower. Low processing temperature of 290 °C or lower is a necessary condition not to deteriorate the barrier resin layer in the multi-resin layer; because the EVOH resin of the barrier resin layer is not decomposed thermally in the extrusion equipment, the barrier properties are not damaged and the problems such as gelation and film breaking are prevented. In addition, deterioration of the multi-layered laminate film by oxidation can be reduced to a minimum, and

the odor of the laminate itself can be reduced. Tatsuhiko is silent about this processing temperature of 290 °C or lower.

(3) Applicants respectfully submit that Tatsuhiko does not teach or suggest a barrier resin layer as recited in claim 1.

The Office Action takes the position that Tatsuhiko teaches a resin layer that can be an ethylene-vinyl alcohol copolymer. (Office Action, page 2.) However, Tatsuhiko discloses the use of polyamide resin as the barrier layer and does not disclose an EVOH barrier layer. There is no description in Tatsuhiko that EVOH can be used instead of polyamide resin obtained by m-xylene diamine and adipic acid. Tatsuhiko merely discloses that EVOH is a resin which can be blended to the polyamide resin. This is also supported at paragraph 1 of Tatsuhiko which states that its invention relates to a laminate of base paper and polyamide resin.

For at least the foregoing reasons, claims 1, 2, 6, 7, 11-17, 19-28 and 30-32 are patentable over the cited references. Accordingly, withdrawal of the rejections of claims 1, 2, 6, 7, 11-17, 19-28 and 30-32 is hereby solicited.

In view of the above remarks, Applicants submit that the claims are in condition for allowance. Applicants request such action at an early date.

If the Examiner believes that this application is not now in condition for allowance, the Examiner is requested to contact Applicants' undersigned attorney to arrange for an interview to expedite the disposition of this case.

If this paper is not timely filed, Applicants respectfully petition for an appropriate extension of time. The fees for such an extension or any other fees that may be due with respect to this paper may be charged to Deposit Account No. 50-2866.

Respectfully submitted,

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